

Upper Pit Disadvantaged Communities' Human Right to Water and Drought  
Sustainability Projects  
*North Cal-Neva Resource Conservation and Development Council, Inc.*

**Attachment 3 – Work Plans**

**PROJECT 1: Grant Administration**

**IMPLEMENTING AGENCY:** North Cal-Neva Resource Conservation and Development Council, Inc. (RC&D)

**PROJECT DESCRIPTION:** The Regional Water Management Group (RWMG) authorized the RC&D to act as the grant applicant and the grant manager for the Proposition 84, IRWM 2015 Grant. The RC&D will administer these funds and respond to DWR's reporting and compliance requirements associated with the grant administration. This office will act in a coordination role: disseminating grant compliance information to the project managers responsible for implementing the projects contained in this agreement, obtaining and retaining evidence of compliance (e.g., CEQA/NEPA documents, reports, monitoring compliance documents, labor requirements, etcetera), obtaining data for progress reports from individual project managers, assembling and submitting progress reports to the State, and coordinating all invoicing and payment of invoices.

**Budget Category (a): Direct Project Administration**

Task 1 - Agreement Administration

The RC&D will respond to DWR's reporting and compliance requirements associated with the grant administration and will coordinate with the project managers responsible for implementing the projects contained in this agreement.

Task 2 - Invoicing

The RC&D will be responsible for compiling invoices for submittal to DWR. This includes collecting invoice documentation from each of the project proponents and compiling the information into a DWR Invoice Packet.

Task 3 - Progress Reports and Project Completion Report(s)

The RC&D will be responsible for compiling progress reports for submittal to DWR. The RC&D will coordinate with project proponent staff to retain consultants as needed to prepare and submit progress reports and final project completion reports for each project, as well as the grant completion reports.

Reports will meet generally accepted professional standards for technical reporting and the requirements terms of the contract with DWR outlined in Exhibit G of this agreement. For example, progress reports will explain the status of the project and will include the following information: summary of the work completed for the project during the reporting period; activities and milestones achieved; and accomplishments and any problems encountered in the performance of work. Project completion reports will include: documentation of actual work done, changes and amendments to each project, a final schedule showing actual progress versus planned progress, and copies of final documents and reports generated during the project.

**Deliverables:**

- ☐ Executed Grant Agreement
- ☐ Invoices and associated backup documentation
- ☐ Progress Reports

- ☐ Draft and Final Project Completion Report

## **PROJECT 2: Pit River Streambank Stabilization and Riparian Improvement with Floodplain Enhancement**

**IMPLEMENTING AGENCY:** Modoc Resource Conservation District

**PROJECT DESCRIPTION:** The proposed project will be located along the banks of the Pit River in the Warm Springs Valley, approximately 5 miles west of Alturas, CA. The project is designed to stabilize the streambank and restore the riparian corridor. Bank stabilization measures will include sloping and installing rock structures which include rock rip-rap, horizontal peaked stone toe protection, and rock filled gabion baskets. Riparian corridor restoration measures will include willow planting and seeding a mixture of grass and forb species. Installing jute material and applying mulch will be done in sloping areas to protect bare soil and improve seed germination. Treatments on the floodplain will focus on reducing streambank erosion were flood and irrigation waters flow back into the river. The implementation of these treatments will be followed by weed control to reduce the occurrence of invasive species from spreading along the river bank and floodplain. The benefits provided by bank stabilization and riparian corridor restoration include reduced sediment in the water and increased acres of riparian habitat.

### **Budget Category (a): Direct Project Administration**

#### Task 1 - Project Management

Manage grant agreement including compliance with grant requirements, and preparation and submission of supporting grant documents and coordination with IRWM regional manager, North CalNeva RC&D. Prepare invoices including relevant supporting documentation for submittal to DWR via CalNeva RC&D. This task also includes administrative responsibilities associated with the project such as coordinating with partnering agencies, and managing consultants/contractors. This task also includes grant application preparation and submittal for the Modoc RCD.

#### **Deliverables:**

- ☐ Environmental Information Form (EIF)
- ☐ Financial Statements
- ☐ Invoices
- ☐ Other Applicable Project Deliverables

#### Task 2 - Labor Compliance Program

Take all measures necessary to ensure compliance with applicable California Labor Code requirements, including, preparation and implementation of a labor compliance program or including any payments to the Department of Industrial Relations under Labor Code Section 1771.3.

#### **Deliverables:**

- ☐ Proof of labor compliance upon request

#### Task 3 - Reporting

Prepare progress reports detailing work completed during reporting period as outlined in Exhibit G of this agreement. Submit reports to CalNeva RC&D for review and inclusion in a progress report to be submitted to DWR.

Prepare draft Final Project Completion Report and submit to DWR via Cal-Neva RC&D for DWR Project Manager's comment and review no later than 90 days after project completion. Prepare Final Report addressing CalNeva RC&D /DWRs comments. The report shall be prepared and presented in accordance with the provision of Exhibit G.

**Deliverables:**

- ☐ Quarterly Project Progress Reports
- ☐ Draft and Final Project Completion Report

**Budget Category (b): Land Purchase/Easement**Task 4 – Land Purchase

This task is not applicable to this project, as there is no land purchase or easement negotiation required to complete it.

**Deliverables:**

- ☐ Not applicable

**Budget Category (c): Planning/Design/Engineering/Environmental Documentation**Task 5 - Feasibility Studies

Feasibility analysis was completed as part of the project development process. An evaluation team composed of NRCS staff, Modoc RCD staff, and land owners looked at and analyzed different options for bank stabilization and riparian enhancement. Technical references for this process included Stream Corridor Restoration Principles, Processes, and Practices-Stream Corridor Restoration Handbook, 2001, California Riparian Habitat Restoration Handbook, 2009, and past project experiences of Modoc Resource Conservation District staff. Goals and objectives of the proposed plan were reviewed for compatibility with Upper Pit River IRWM Plan. This task is 100% complete.

**Deliverables:**

- ☐ Preliminary project design details with map.
- ☐ Documentation showing inclusion in IRWM Plan.

Task 6 – CEQA Documentation

Preliminary project plan development includes completion of preliminary design including selection of treatment techniques with approximate site locations, also complete archaeological and biological reports. These tasks have been completed on 60% of the proposed project area. Additional river bank was added to the project, Therefore, existing plans and archeological and biological reports need updating to include the entire project area.

Prepare a Notice of Exemption (including tribal notification to the California Native Heritage Commission). Complete review of project qualifying for exemption 15333 - small habitat restoration projects.

File Notice of Exemption with Modoc County Recorder. Prepare letter stating no legal challenges. This task is 0 % complete.

**Deliverables:**

- ☐ Archeological Inventory Report updates
- ☐ Biological Inventory Report updates
- ☐ Copy of filed Notice of Exemption
- ☐ No Legal Challenges letter

Task 7 - Permitting

Acquire California Department of Fish and Wildlife - Streambank Alteration Permit, Central Valley Regional Water Quality Control Board - Water Quality Certification Permit, and Army of Corp Engineers - Section 7 Nation Wide Permit. Task is to fill out applications and submit to appropriate Agency with all required information. Draft copies of permits have been completed for 40% of project area, permit applications need to be updated to include the entire current proposed project. This task is 25% completed.

**Deliverables:**

- ☐ Approval of all required permits

**Task 8 - Design**

Complete final design including the following supporting work: Stream channel cross sections survey and design and quantity calculations for bank sloping and Floodplain water spreader dams, final design for each rock treatment including rock sizing and quantities for rock filled gabion baskets, Groins and barbs, Bank rip-rap, Longitudinal peaked stone toe protection, and Side channel rip-rap. Final design details, area calculations and quantities for willow and shrub planting and grass and forb seeding. Final updated project cost estimate for restoration treatments which includes cost break down for earth work, rock work and vegetative plantings. Project work completed for this task is 0%.

**Deliverables:**

- ☐ Updated Project Cost Estimate
- ☐ 100% Design Documents for each type of treatment listed

**Task 9 - Project Performance Monitoring Plan**

Develop and submit a Project Performance Monitoring Plan. The Project Performance Monitoring

Plan will include baseline conditions, a brief discussion of monitoring systems to be used, methodology of monitoring, frequency of monitoring, and location of monitoring points. This task is 0 % complete.

**Deliverables:**

- ☐ Project Performance Monitoring Plan

**Budget Category (d): Construction/Implementation****Task 10 - Contract Services**

Activities necessary to secure a contractor and award the contract include: develop bid documents prepare advertisement and contract documents for construction contract bidding, conduct pre-bid meeting, bid opening and evaluation, selection of the contractor, award of contract, and issuance of notice to proceed. This task is 0 % complete.

Separate contracts/bid requests will be developed for the following construction activities;

- Bid request for procurement and delivery of rock to project site;
- Bid requests for procurement for gabion baskets, fence material, seed, some shrub plants and mulch.
- Contract for equipment with operator (Excavator, dump truck etc.) for the construction of all listed rock restoration treatments, bank sloping treatments, and small spreader dams on floodplain, Contract for Fence construction.
- A field crew will be hired to cut and plant willows and does the seeding, mulching and install jute cover.

**Deliverables:**

- ☐ Bid documents
- ☐ Proof of Advertisement
- ☐ Award of contract
- ☐ Notice to proceed
- ☐ Proof of Hiring of Field Crew

**Task 11 - Construction Administration**

This task includes managing contractor submittal review, answering requests for information, and issuing work directives. A contract project coordinator will be on site for the duration of the

project. Project coordinator duties include: documenting of pre-construction conditions, daily construction diary, preparing change orders, addressing questions of contractors on site, reviewing/ updating project schedule, reviewing contractor log submittals and pay requests, forecasting cash flow, notifying contractor if work is not acceptable. Project coordinator will also direct field crew in willow cutting and planting, seeding, mulching and jute placement. This task is 0 % complete.

**Deliverables:**

- ☐ Notice of Completion
- ☐ Field crew activity report

**Task 12 - Construction/Implementation Activities**

This task involves the construction and installation of the various restoration treatments identified for this project. This task is 20% complete, some floodplain construction involving small spreader dams, land leveling, bank sloping and rock riprap was completed as a NRCS/landowner project. This work was completed as part of the overall project. Individual tasks are listed below:

- a. Mobilization and Demobilization - This task involves the transportation of equipment to and from the project site, clean-up of project site once work is completed.
- b. Fence contractor and material to build 4-barbed wire fence to exclude livestock from riverbank.
- c. Equipment and material for construction of specified rock and earth moving restoration treatments
  - Transport rock; construct each rock feature as designed at each specific site.
  - Excavate bank slope to specified slope as identified at each specific site. Use excavated material for small spreader dam construction as specified.
  - Assemble gabion baskets and fill with rock as specified for each specific site identified.
- d. Field crew and material to work on specified vegetative restoration treatments
  - Cut willows, bundle in bunches, transport to water site and let soak until planted.
  - Hand seed identified areas, spread mulch, and instal jute mating
  - Plant willows at designated sites using water stinger, plant other shrubs with auger.

**Deliverables:**

- ☐ Photographic documentation

**PROJECT 3: Fall River Resource Conservation District / Pit Resource Conservation District Open Ditch Conversion Water Conservation / Water Supply DAC Projects**

**IMPLEMENTING AGENCY:** Fall River Resource Conservation District (RCD)

**PROJECT DESCRIPTION:** Work to be done: this project consists of multi-watershed open ditch conversions at five sites located at Burney Creek, Pit River, Pit River Tailwater, Taylor Creek and Willow Creek. The project will conserve water at the rate of 26% for each open ditch conversion and these water savings can be accurately tracked because water use after project implementation can be compared to landowners' prior records of water use. By conserving water, this project will improve local water supply both for current agricultural users and downstream water users. Project will improve water quality by reducing / eliminating the possibility of ditch breakage and silt incursions into the adjacent Pit River, which has a 303d listing for sediment and which has suffered silt incursions from ditch breakage in the past. Project has the potential increase in-stream water quantities, which would benefit habitat.

## **Budget Category (a): Direct Project Administration**

### Task 1 - Project Management

Manage grant agreement including compliance with grant requirements, and preparation and submission of supporting grant documents and coordination with IRWM regional manager and Fall River RCD. Prepare invoices including relevant supporting documentation for submittal to DWR via Fall River RCD. This task also includes administrative responsibilities associated with the project such as coordinating with partnering agencies, and managing consultants/contractors.

Contractor will be solicited through two separate bid requests. It is possible that a single contractor could be awarded all contracts. Contractor solicitation will commence upon grant execution. Contracts will be let for the new pumps and their installation and for the pipeline construction.

#### **Deliverables:**

- ☐ Environmental Information Form (EIF)
- ☐ Financial Statements
- ☐ Invoices
- ☐ Other Applicable Project Deliverables

### Task 2 - Labor Compliance Program

Take all measures necessary to ensure compliance with applicable California Labor Code requirements, including, preparation and implementation of a labor compliance program or including any payments to the Department of Industrial Relations under Labor Code Section 1771.3.

#### **Deliverables:**

- ☐ Proof of labor compliance upon request

### Task 3 - Reporting

Prepare progress reports detailing work completed during reporting period as outlined in Exhibit G of this agreement. Submit reports to Fall River RCD for review and inclusion in a progress report to be submitted to DWR.

Prepare draft Final Project Completion Report and submit to DWR via Fall River RCD for DWR Project Manager's comment and review no later than 90 days after project completion. Prepare Final Report addressing Fall River RCD/DWRs comments. The report shall be prepared and presented in accordance with the provision of Exhibit G.

#### **Deliverables:**

- ☐ Quarterly Project Progress Reports
- ☐ Draft and Final Project Completion Report

## **Budget Category (b): Land Purchase/Easement**

### Task 4 – Land Purchase

This portion of the work plan is not applicable; four of the open ditch conversion projects are on private property and no easement is needed.

The Burney Creek Open Ditch Conversion project is on a neighbor's property and there is already an easement in place.

#### **Deliverables:**

- ☐ Documentation supporting property value (if purchased)
- ☐ All relevant documentation regarding property ownership transfer or acquisition of easement including final recorded deed, title report, etc.

## **Budget Category (c): Planning/Design/Engineering/Environmental Documentation**

### Task 5 - Feasibility Studies

Project Feasibility Studies have been completed by NRCS as part of the project development process for the open ditch conversion projects, so the project has been assessed with respect to its technical feasibility. Specifically with respect to system knowledge, all work will be accomplished by locally based independent contractors and volunteers who have already been identified. Knowledge of the region, the resources, and the affected community are well documented. There are no data gaps for project development. Because the project location is so well known, there are no doubts that the project will achieve its goals as designed

#### **Deliverables:**

- ☐ Relevant Feasibility Studies

### Task 6 – CEQA Documentation

Prepare and circulate a Notice of Preparation (including tribal notification to the California Native Heritage Commission). Prepare draft Environmental Impact Reports (EIR) and release document for public review. File Notice of Completion with State Clearinghouse. Prepare letter stating no legal challenges (or addressing legal challenges). For open ditch conversions, this will include archeological surveys and reporting, project will conduct threatened and endangered species assessments.

No extraordinary restrictions have been placed on this project. Apart from the items above referenced, the project requires no permits nor additional environmental documentation, and therefore after the archaeological work and the threatened/endangered species surveys, the project is ready to proceed.

#### **Deliverables:**

- ☐ Copy of Notice of Preparation
- ☐ Draft and Final EIR
- ☐ Copy of Notice of Completion
- ☐ No Legal Challenges letter

### Task 7 - Permitting

Acquire archeological surveys and reporting, and conduct threatened and endangered species assessments for open ditch conversions.

No extraordinary restrictions have been placed on this project. NRCS states that the project requires no NEPA, no CEQA, no other permits and no additional environmental documentation, and therefore after the archaeological work and the threatened/endangered species surveys the project is ready to proceed.

California Environmental Quality Act (CEQA): The Fall River Resource Conservation District staff and its Board of Directors have reviewed the proposed project environmental analysis and determined that it is exempt from the California Environmental Quality Act under Section 15304 of the Guidelines, which exempts minor alterations in the condition of land, water, and/or vegetation which do not involve removal of healthy, mature, scenic trees except for forestry or agricultural purposes. The Pit RCD will file a Notice of Exemption with the Lassen County Clerk for projects within their jurisdictional boundaries

National Environmental Policy Act (NEPA): Project is not subject to NEPA.

The Fall River Open Ditch project is cleared by NRCS for Cultural Resources and Threatened and Endangered Species. The other sites need Archaeological and Threatened and Endangered Species surveys; NRCS will use the California Fish and Game California Natural Diversity Data Base for information to streamline the application process.

**Deliverables:**

- ☐ All required permits

**Task 8 - Design**

Complete preliminary design including the following supporting work: geotechnical investigation, topographic survey, and basis of design report (BOD). The BOD will provide the overall project concept for use in development of final design, plans and specifications including: preliminary earthwork calculations, preliminary design details for pipe installation, and 100% (Final) design, plans, and specifications.

Project status: Design / engineering for conveyances for open ditch conservation are in place and ready to be finalized; this will include quantities and estimated costs.

The project is not subject to permitting. Cost share will be provided by project partners throughout the life of the project. The project is ready to proceed upon grant award.

Project layout will be completed within two months of the award.

**Deliverables:**

- ☐ Topographic Survey
- ☐ BOD Report
- ☐ Updated Project Cost Estimate
- ☐ 100% Design Documents

**Task 9 - Project Performance Monitoring Plan**

Develop and submit a Project Performance Monitoring Plan. The Project Performance Monitoring Plan will include baseline conditions, a brief discussion of monitoring systems to be used, methodology of monitoring, frequency of monitoring, and location of monitoring points.

Analyze water conservation rates, real time, on open ditch conversion project.

The pre and post water pumping/flow monitoring will occur during the irrigation season before the project is started and in the following seasons after the work is completed.

**Deliverables:**

- ☐ Project Performance Monitoring Plan

**Budget Category (d): Construction/Implementation****Task 10 - Contract Services**

Activities necessary to secure a contractor and award the contract include: develop bid documents, prepare advertisement and contract documents for construction contract bidding, conduct pre-bid meeting, bid opening and evaluation, selection of the contractor, award of contract, and issuance of notice to proceed.

***Construction Contracting:***

Pipeline installation work will be solicited through five separate bid requests as there are five open ditch conveyance sites. It is possible that a single contractor could be awarded more than one, even all, of the contracts. Contractor solicitation will commence upon grant execution. Contracts will be let for the pipeline construction. Bids are prepared and ready for advertisement.

**Deliverables:**

- ☐ Bid documents
- ☐ Proof of Advertisement
- ☐ Award of contract



- ☐ Notice to proceed

#### Task 11 - Construction Administration

This task includes managing contractor submittal review, answering requests for information, and issuing work directives. A full time engineering construction observer will be on site for the duration of the project. Construction observer duties include: documenting of pre-construction conditions, daily construction diary, preparing change orders, addressing questions of contractors on site, reviewing/ updating project schedule, reviewing contractor log submittals and pay requests, forecasting cash flow, notifying contractor if work is not acceptable.

Project will include site preparation such as leveling and digging a trench. At Pit River Open Ditch Conversion and Tailwater Recovery project, the first phase of the project is electrical line extension and diesel motor replacement. At all five sites, pipe installation is the next phase of construction. The final phase is back-filling. Monitoring will be a component of construction completion.

#### **Deliverables:**

- ☐ Notice of Completion

#### Task 12 - Construction/Implementation Activities

Construction activities are outlined below.

- a. Site preparation will include leveling, may include digging a trench. At all five project sites, pipeline will be installed. With some projects, ditch may be utilized as a location for incoming pipe; some projects will require digging a trench.
- b. Pipeline Installation: pipe used will be PVC, with the exception of 600' of 24" HDPE pipe on the Pit River Open Ditch Project, which is a kind of poly pipe.
  - At the Burney Creek Open Ditch Conversion site, 9,500 feet of 10" and 12" pipe will be installed.  
At the Pit River Open Ditch Conversion site, 2,400 feet of 24" & 18" pipe will be installed.
  - At the Pit River Tailwater Open Ditch Conversion site, 5,400 feet of 18" pipe will be installed.
  - At the Taylor Creek Open Ditch Conversion site, 5,600 feet of 18" pipe will be installed.
  - At the Willow Creek Open Ditch Conversion site, 5,700 feet of 15" pipe will be installed.
- c. Electrical Line Extension: At Pit River Open Ditch Conversion and Tailwater Recovery project, the first phase of the project is electrical line extension. 8,280 feet of primary electrical line will be extended to the pump location in a buried trench. Work will be conducted as soon as possible after award of contract with the landowner digging and filling in the trenches
- d. Replacement of Diesel Motor: At Pit River Open Ditch Conversion and Tailwater Recovery project, the motor and pipeline will be replacing the use of a tractor to move water throughout the irrigated cropland. Currently, the tractor pumps water from rice field to rice field; the new mainline will replace the need for the tractor powered pump. Water will now be conveyed via the pipeline directly to each rice field. The pump that is being installed will use the planned pipeline to reuse the tailwater from the rice fields, reducing water quality impacts due to tailwater entering the Pit River. Pump will be installed by the end of May 2016.

The motor and pipeline will be replace the use of a tractor to move water throughout the irrigated cropland; the new mainline will replace the need for the tractor powered pump. Water will now be conveyed via the pipeline directly to each rice field. The pump

that is being installed will use the planned pipeline to reuse the tailwater from the rice fields, reducing water quality impacts due to tailwater entering the Pit River.

- e. Backfill: At all five project sites, ditches will be covered; pipes in trenches covered.

**Deliverables:**

- ☐ Photographic documentation
- ☐ Engineers Certification